

INSTRUCTIONS

2004 Biennial Pollution Prevention (P2) Progress Report (Using 2003 TRI data)

TOXIC RELEASE CATEGORY

Toxics and Hazardous Waste Reduction Law 38 MRSA Sections 2301-2313



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Instructions for completing the Toxic Release Category of the Biennial Pollution Prevention (P2) Progress Report.

Applicability: If a facility is required to report to the Environmental Protection Agency (EPA) under EPCRA, Title III, Section **313** for Toxic Release Inventory (TRI), this report must be completed unless that facility meets any of the following exemptions:

- A. Drinking water supply treatment facilities;
- B. Municipal wastewater treatment facilities;
- C. Wholesale distributors of chemicals;
- D. Hazardous substance transporters;
- E. Retail and wholesale distribution facilities of motor fuel, aviation fuel, heating oil or other refined petroleum products;
- F. Agricultural activities;
- G. Commercial hazardous waste treatment or storage facilities;
- H. For purposes of the planning, reporting and fee requirements relating to hazardous waste generation only, pilot plants or pilot production units;
- I. Hazardous waste transporters;
- J. Hazardous waste generated as a result of remedial or corrective actions or facility closures required by law or undertaken to protect employee health and safety, public health and safety or the environment;
- K. Households;
- L. Zinc emissions from tire burning;
- M. Sulfuric acid emissions from burning fuel that is approved by the department; and/or
- N. Lamps, mercury-containing thermostats, polychlorinated biphenyl ballast and batteries, defined as universal waste in 40 Code of Federal Regulations, Section 273.2

Hardcopy Reporting Instructions:

1. Clearly print information on the report form in the spaces provided.
2. Do not leave any spaces blank. If an item does not apply, enter N/A.
3. You have the option of submitting the report by e-mail or hardcopy. If you choose electronic reporting, built in macros will do the math calculations automatically.
4. For additional guidance when filling out the report, please refer to:
A) the Toxics Law: <http://www.maine.gov/dep/oia/thwrp/index.htm>
B) the P2 Guidebook: <http://www.maine.gov/dep/oia/thwrp/thwrpguide.pdf>

Electronic Reporting Instructions:

Please note that this form is also available on the Toxics Web site at:

<http://www.maine.gov/dep/oia/thwrp/forms.htm>

1. The **Company Name** must be in cell **B1**.
2. The **Address** must be in cells **B2** and **B3**.
3. The **City, State** and **Zip Code** must be in cell **B4**.
4. The **TRI ID #** (if known) must be in cell **B5**.
5. Each **TRI chemical released or otherwise used** can only have one line and the first TRI chemical must begin with Row 8.
6. If **more than** one Waste Code, Waste Minimization Code or Future Waste Minimization Code is used, they **must be separated by a comma**.
7. If a facility needs **additional** rows on the spreadsheet, call Jim Rodrigue at 207-287-8867 for instructions on “unprotecting” the spreadsheet.

SECTION 1. BASE YEAR ('90/'91) AND REPORT YEAR (2003) INFORMATION

- 1.1 **Chemical Identification** - CAS # (Chemical Abstracts Service #). Enter the numerical code for each Toxic Release Inventory (TRI) chemical reported under EPCRA, Title III, Section **313**. This number can be found on the Material Safety Data Sheet (MSDS).
- 1.2 **Chemical Name** - write the chemical name that corresponds to each CAS #.

- 1.3 Base Year** – the reductions or increases in toxics release will be measured from a base year. Section 2303.2 of the Toxics Law requires that the average number of pounds of each TRI chemical reported for 1990 & 1991 be used as the base year. (Note exception below). An alternative base year is acceptable only if the facility and DEP do not have accurate data for the required base year ('90/'91). The Department must review and approve all alternate base years.

Exception: The **1st full year** of production data must be used as the base year if:

- A. The facility was not in business during the approved base year ('90/'91),
- B. The facility released or otherwise used a new TRI chemical after 1991, and/or
- C. A previously unregulated TRI chemical becomes regulated after 1991.

Important: Since Lead, PAC's and PBT's were not regulated until after '90/'91, use the first full year of production data after they became regulated as the Base Year (BY).

BY for Lead will be 2001

BY for PAC's will be 2000

BY for PBT's will be 2000

Effective reporting year 2004, Release category only: AMMONIA

Ammonia only needs to be reported if more than 10,000 pounds were added to the system during the reporting year, not if the system merely holds 10,000 pounds.

Example: During 2003, a berry freezing facility that held 6,000 pounds of ammonia wanted to expand its capacity to 12,000 pounds. The original 6,000 pounds needed to be removed for the expansion to take place. Following the expansion, the original 6,000 pounds of ammonia was replaced back into the system, plus an additional 6,000 pounds was added to fill the system to capacity. This facility would have to report because a total of 12,000 pounds of ammonia was added to the system during a reporting year, exceeding the 10,000 pound threshold.

- 1.4 Base Year Amount Reported** – enter the average number of pounds of each TRI chemical reported under EPCRA, Title III, Section 313, in **1990 & 1991**, in the Base Year Amount column. This information can be found on the TRI report submitted to the EPA, and/or on the 2002 P2 Progress Report, Toxics Release Category. There can be no zero for the Base Year Amount. The Base Year Amount for a TRI chemical released or otherwise used after 1991, will be the amount of the **1st full year** of production in which that TRI chemical was released or otherwise used. Enter a total for all TRI chemical(s) reported on the bottom line of the form. Please refer to the Toxics Law Section 2304-A(2), or the P2 Guidebook (page 7), for a complete list of exemptions.

- 1.5 2004 Amount Reported** – enter the number of pounds of each TRI chemical released or otherwise used during 2003 in the Report Year column. This information can be found on the TRI report (EPCRA, Title III, Section 313, Form R or Form A), submitted to EPA in 2003. Enter a total for all TRI chemical(s) reported on the bottom line of the form. Again, please refer to the Toxics Law Section 2304-A.(2), or the P2 Guidebook (page 7), for a complete list of exemptions.

- 1.6 2004 Activity Production Index (API)** – the API is a ratio of the facility’s current (2003) activity/production, to its base year activity/production. The API indicates whether the activity/production has increased or decreased in relation to the base year. It is used to adjust the amount of TRI chemicals released or otherwise used up or down in relation to the activity/production. All facilities started with an API of 1 in the base year. In subsequent years, facilities will have a higher API if the activity/production has increased, or a lower API if the activity/production has decreased. Most API’s will fall in the range of 0.5 – 3.0.

The API is calculated using a unit of product that is unique for your operation. It should be an activity or product that is closely related to the release or otherwise use of each reported TRI chemical. Examples of a unit of product include: number of “widgets” produced, amount of hours a particular operation is conducted, or pounds or square footage of material processed. Once the unit of product is chosen it should remain constant.

For example, XYZ Company uses the number of “widgets” produced as the API. In the base year, they produced 100 “widgets” and had an API of 1. In 2003, XYZ Company produced 200 “widgets”. Therefore, the API would be 2 as the following ratio demonstrates:

$$\text{API} = \frac{200 \text{ (widgets in 2003)}}{100 \text{ (widgets in base year)}} \quad \text{API} = 2$$

Please note the API is closely tied to production. If a facility has different processes that release or otherwise use a TRI chemical, more than one API may be derived to represent each production process. A production process is also known as a Production Unit. To determine the API, insert the unit of production (such as # of widgets produced) into the numerator and denominator of the following formula:

$$\text{API} = \frac{2003 \text{ Production or Activity}}{\frac{1}{2} (1990 + 1991) \text{ Production or Activity}}$$

For additional information on calculating the API, please refer to the P2 Planning Guidebook dated January 2003.

- 1.7 2004 Adjusted Amount** – the 2004 Adjusted Amount is the number of pounds of a TRI chemical released or otherwise used during 2003, normalized by the API, and is calculated as follows:

$$\text{Toxic Release Adjusted Amount 2003} = \frac{\text{Pounds of TRI chemical released in 2003}}{\text{API 2003}}$$

If you are using the Excel formatted spreadsheet provided by the Department via email or downloaded from the Toxics Web site, column 1.7 & 1.8 will be calculated automatically.

- 1.8 2004 Reduction %** – the following equation is used to calculate reductions or increases in TRI chemical(s) released or otherwise used. It should be performed for each TRI chemical, and for the total TRI chemical(s) released, using the information from the spreadsheet in columns 1.4 and 1.7.

Toxics Release Reduction % =

$$\left(\frac{\text{Adjusted Amount Lbs. (column 1.7)} - \text{Lbs. toxics released in base year (column 1.4)}}{\text{Pounds of toxics released in base year (column 1.4)}} \right) \times 100$$

The reduction amount calculated must be reported as an increase if the amount is a positive number, or as a decrease if the amount is a negative number.

- 1.9 Waste Minimization Code** – using the attached waste minimization codes (also available on the Toxics Web site), provide the code(s) that best describes the method(s) used to achieve the reporting year (2003) reductions. More than one code may be used, but be sure to separate them by a comma if filing electronically. If the release or otherwise use of a TRI chemical has increased since the base year (i.e. a positive number in column 1.8), the waste minimization code will be N/A.

SECTION 2. FUTURE REDUCTION GOALS

- 2.0 This column was intentionally deleted, no information needed from any facility.**

- 2.1-2.2 Future Reduction Goal** – enter the facility specific, planned reduction goal from the Pollution Prevention (P2) Plan, for each of the following biennial reporting periods:

(2.1) 2004

(2.2) 2006

At a minimum, a goal must be entered for the aggregate amount of TRI chemical(s) released or otherwise used in the total line at the bottom of the page. A specific reduction goal for each TRI chemical released or otherwise used may also be entered, though this is not mandatory.

Future goals should be established from existing baseline data and build upon current reductions. For example, if the facility has already achieved a 40% reduction from the base year, the reported reductions should match the 40% reduction goals previously set for 2004. For 2006, the goal could be 45% or 50% for example, but should not be below the 40% already achieved. A 100% reduction goal indicates a plan for completely eliminating the release or otherwise use of a TRI chemical. If no further reductions are anticipated, the future goals should be set at the current percentage (from column 1.8). For example, if the facility has achieved a 40% reduction to date, and does not anticipate making further reductions, the future reduction goals will be 40%. Please refer to the Toxics Law, Sections 2305.2-A and 2305-A.1, or the P2 Planning Guidebook dated January 2003 for additional information.

- 2.3 Production Unit I.D.** – provide the identification code (up to ten characters) for the Production Unit where the TRI chemical is released or otherwise used. Production Unit means “a process, line, method, activity or technique, or a combination or series thereof, used to produce a product”. It should be a term that is easily recognized by all employees throughout the facility. For example, a facility may identify the Production Unit where the TRI chemical is released or otherwise used as “#6 Fuel” (for PAC’s). The I.D. code must be identical to the one used in the facility’s P2 Plan and should remain constant from year to year. For additional information on determining the facility’s Production Unit(s), please refer to the P2 Planning Guidebook dated January 2003.
- 2.4 Future Method Reduction Code** – using the attached Waste Minimization codes, (also available on the Toxics Web site), provide the code(s) that best describes the method(s) to be used to achieve the planned reductions. For electronic reporting, if more than one code is used, be sure to separate the codes by a comma.
- 2.5 Explanation of Facility’s Progress** – attach a written explanation (Word Document if reporting electronically) as to why the facility’s progress is greater than or less than that anticipated in the P2 Plan schedule for implementation, if this applies. This portion should be written in a complete and concise (1 page) format and pertain to the reported TRI chemical(s). The information will be provided to the public on the Toxics Program’s Web page along with the spreadsheet, as an additional explanation of the data.
- 2.6 Written Description of Employee Notification and Involvement** – attach a written description (Word Document if reporting electronically) of your “employee notification” and “involvement” in the P2 Planning process. This section should be concise (1 page), but comprehensive, including “methods of notification,” “training,” and “involvement” in the planning process. Please refer to the Toxics Law, Sections 2305.4 and 2306, or the P2 Guidebook dated January 2003 for additional information.
- 2.7 Report Confidentiality** – If any line items are confidential, please enter the word **TRUE** in the “Confidential” column for the appropriate rows on Sheet 1.
Note: Only line items with the word **TRUE** entered in the “Confidential” column will be considered confidential.
- 2.8 Host Municipality** – a copy of this report must be sent to the municipality (town manager or selectmen) in which the facility is located, at the time of submission to the DEP, **(by July 1, 2004)**.
- 2.9 Report Certification** – the senior official representing facility management, by initialing the acknowledgement box on the report, verifies the contents of the report, completion and updating of the P2 Plan, and availability of the Plan to the Department for review. This section needs to be completed and dated or the progress report will not be considered valid.

Should the Department need clarification or have questions about the report, the environmental contact person (if different than the senior official), should be noted with the phone number and e-mail address.

**This report must be submitted by July 1, 2004 to:
The facility's host municipality and**

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